WHAT IS CLAIMED IS:

1. An image processing apparatus having a plurality of image processing means for performing predetermined image processing on input image data and for outputting processed image data, said image processing apparatus comprising:

creation means for creating packet data by adding to the image data a header in which image processing information is described; and

transfer means for transferring the packet data between said creation means and each image processing means,

wherein said plurality of image processing means inputs the packet data from said transfer means, performs image processing on the image data on a basis of the image processing information described in the header, recreates packet data by adding a header in which the image processing information is rewritten to the image data after processing, and outputs the recreated packet data to said transfer means.

2. An image processing apparatus according to Claim 1, wherein said image processing information is processing sequence information of image processing performed by said plurality of image processing means and processing content information of image processing performed by each image processing means.

3. An image processing apparatus according to Claim 2, wherein identification information of the image processing means and processing content information corresponding to the identification information are described in the header from the beginning thereof in accordance with a sequence in which processing is to be performed.

4. An image processing apparatus according to Claim 3, wherein said image processing means comprises:

input means for inputting the packet data in such a manner as to be divided into a header and image data;

header analysis means for analyzing the processing content information described at the beginning of the header input by said input means;

processing means for performing processing on the image data input by said input means on a basis of an analysis result by said header analysis means;

header creation means for creating a new header such that identification information of the image processing means which next performs image processing and processing content information corresponding to the identification information are located at the beginning of the header; and

output means for newly creating packet data from the image data processed by said image processing means and from

the header created by said header creation means and for outputting the newly created packet data.

5. An image processing apparatus according to Claim 4, wherein image data which forms the packet data is rectangular image data obtained by dividing image data in page units into rectangular areas of a predetermined size.

6. An image processing apparatus according to Claim 5, wherein image data which forms the packet data is raster image data.

7. An image processing apparatus which has a plurality of image processing means for performing predetermined image processing on input image data and for outputting the image data and which performs a plurality of device function operations in parallel using a connected external device, said image processing apparatus comprising:

first creation means for adding to the image data a header in which image processing information is described corresponding to a first device function operation in order to create first packet data;

second creation means for adding to the image data a header in which image processing information is described corresponding to a second device function operation in order

to create second packet data; and

transfer means for transferring packet data among said first creation means, said second creation means, and each image processing means,

wherein said plurality of image processing means comprise first image processing means which inputs the first packet data from said transfer means, which performs image processing on image data on a basis of the image processing information described in the header, which creates packet data by adding a header in which the image processing information is rewritten to the image data after processing, and which outputs the packet data to said transfer means, and second image processing means, while processing related to said first packet data is being performed in said first image processing means, which inputs the second packet data from said transfer means, which performs image processing on image data on a basis of the image processing information described in the header, which creates packet data by adding a header in which the image processing information is rewritten to the image data after processing, and which outputs the packet data to said transfer means.

8. An image processing apparatus according to Claim 7, wherein the image processing information is processing sequence information of image processing performed by said

plurality of image processing means and processing content information of image processing performed by each image processing means.

9. An image processing apparatus according to Claim 8, wherein identification information of the image processing means and processing content information corresponding to the identification information are described in the header from the beginning thereof in accordance with the sequence in which processing is to be performed.

10. An image processing apparatus according to Claim 9, wherein said external device comprises a scanner device, a printer device, and a facsimile device.

11. An image processing apparatus according to Claim 10, wherein the device function operations include a copying operation using said scanner device and said facsimile device, and an image communication operation using said facsimile device.

12. An image processing apparatus which is connected to a predetermined data bus and which transfers packet data to and from an external device via said data bus, the packet data being such that a header in which image processing

information is described is added to image data, said image processing apparatus comprising:

input means for inputting packet data in such a manner that the data is divided into a header and image data, to which packet data is added to the header in which identification information of a device and processing content information corresponding to the identification information are described in sequence from a beginning of the header in accordance with a position in the sequence of a device which performs processing;

header analysis means for analyzing processing content information described at the beginning of the header input by said input means;

image processing means for performing image processing on image data input by said input means on a basis of an analysis result by said header analysis means;

header creation means for creating a new header such that the identification information of an external device which next performs image processing and processing content information corresponding to the identification information are located at the beginning of the header; and

output means for newly creating packet data from the image data processed by said image processing means and from the new header created by said header creation means and for outputting the packet data.

13. An image processing apparatus according to Claim 12, wherein said image processing means performs image processing in a plurality of operation modes, determines an operation mode which is to be performed on a basis of operation mode identification information contained in the analysis result, and performs image processing on the image data.

14. An image processing apparatus according to one of Claim 12 and 13, wherein image data which forms said packet data is rectangular image data obtained by dividing image data in page units into rectangular areas of a predetermined size.

15. An image processing apparatus according to Claim 14, wherein image data which forms the packet data is raster image data.

16. An image processing method which is performed by using a plurality of image processing means for performing predetermined image processing on input image data and for outputting processed image data, said image processing method comprising:

a creating step of creating packet data by adding to

the image data a header in which image processing
information is described;

a transfer step of transferring the packet data created
in said creation step between image processing means; and

an image processing step in which said plurality of
image processing sections inputs said packet data, performs
image processing on the image data on a basis of the image
processing information described in the header, recreates
packet data by adding a header in which the image processing
information is rewritten to the image data after processing,
and outputs the recreated packet data.

17. An image processing method according to Claim 16,
wherein said image processing information is processing
sequence information of image processing performed in said
image processing step, and processing content information of
image processing performed by each image processing section.

18. An image processing method according to Claim 17,
wherein identification information of the image processing
section and processing content information corresponding to
the identification information are described in the header
from the beginning thereof in accordance with a sequence
section in which processing is to be performed.

19. An image processing method according to Claim 18, wherein said image processing step comprises the steps of:

inputting the packet data in such a manner that the data is divided into a header and image data;

analyzing the processing content information described at the beginning of the header input in said input step;

performing processing on the image data input in said input step on a basis of an analysis result in said header analysis step;

creating a new header such that identification information of the image processing section which next performs image processing, and processing content information corresponding to the identification information are located at the beginning of the header; and

newly creating packet data from the image data processed in said processing step and the header created in said header creation step and for outputting the newly created packet data from the image processing section.

20. An image processing method according to Claim 19, wherein image data which forms the packet data is rectangular image data obtained by dividing image data in page units into rectangular areas of a predetermined size.

21. An image processing method according to Claim 20,

wherein image data which forms the packet data is raster image data.

22. An image processing method using a plurality of image processing sections for performing predetermined image processing on input image data and for outputting the image data when a plurality of device function operations using an external device is performed in parallel, said image processing method comprising:

a first creation step of creating first packet data by adding to image data a header in which image processing information is described corresponding to a first device function operation;

a second creation step of creating second packet data by adding to the image data a header in which image processing information is described corresponding to a second device function operation;

a transfer step of transferring the first packet data created in said first creation step and the second packet data created in said second creation step, between image processing sections; and

an image processing step in which, while an image processing section contained in said plurality of image processing sections inputs the first packet data, performs image processing on image data on a basis of the image

processing information described in the header, creates packet data by adding a header in which the image processing information is rewritten to the image data after processing, and outputs the packet data, another image processing section inputs the second packet data, performs image processing on image data on a basis of the image processing information described in the header, creates packet data by adding a header in which the image processing information is rewritten to the image data after processing, and outputs the packet data.

23. An image processing method according to Claim 22, wherein the image processing information is processing sequence information of image processing performed in said image processing step and processing content information of image processing performed in each image processing step.

24. An image processing method according to Claim 23, wherein identification information of the image processing section, and processing content information corresponding to the identification information are described in the header from the beginning thereof in accordance with the sequence in which processing is to be performed.

25. An image processing method according to Claim 24,

wherein said external device comprises a scanner device, a printer device, and a facsimile device.

26. An image processing method according to Claim 25, wherein the device function operations include a copying operation using said scanner device and said facsimile device, and an image communication operation using said facsimile device.

27. An image processing method for use with an image processing apparatus which is connected to a predetermined data bus and transfers packet data to and from an external device via said data bus, the packet data being such that a header in which image processing information is described is added to image data, said image processing method comprising:

an input step of inputting packet data in such a manner that the data is divided into a header and image data, to which packet data is added to a header in which identification information of a device and processing content information corresponding to the identification information are described from a beginning thereof in sequence in accordance with a position in the sequence of a device which performs processing;

a header analysis step of analyzing processing content

information described at the beginning of the header input

in said input step;

an image processing step of performing image processing

on the image data input in said input step on a basis of an

analysis result in said header analysis step;

a header creation step of creating a new header such

that the identification information of an external device

which next performs image processing, and processing content

information corresponding to the identification information

are located at the beginning of the header; and

an output step of newly creating packet data from the

image data processed in said image processing step and from

the new header created in said header creation step and for

outputting the packet data.

28. An image processing method according to Claim 27,

wherein said image processing step performs image processing

in a plurality of operation modes, determines an operation

mode which is to be performed on a basis of operation mode

identification information contained in the analysis result,

and performs image processing on the image data.

29. An image processing method according to Claim 28,

wherein image data which forms said packet data is

rectangular image data obtained by dividing image data in

page units into rectangular areas of a predetermined size.

30. An image processing method according to Claim 29, wherein image data which forms the packet data is raster image data.

31. An image processing apparatus having an image processing unit including N, where N is an integer, function processing sections for performing N different processing functions, and which sequentially transfers a header and image data between the N function processing sections, the header including in sequence first through Nth header parts, each of the N header parts including an ID portion identifying one of the different N processing functions performed by one of the N processing sections, wherein each of said N processing sections comprises:

an input device which inputs the header and image data, and separates the header from the image data;

a header analysis device which identifies which processing function is to be performed based on the ID portion in the first header part of the header;

a processor which processes the separated image data according to the processing function identified by the ID portion in the first header part of the header as identified by said header analysis device;

a header creation device which creates a new header from the input header, including in sequence the second through Nth header parts, with the first header part being deleted; and

an output device for combining and outputting the new header and the processed image from said processor for provision to the processing section identified in the second header part of the new header.